UNITED STATES DEPARTMENT OF COMMERCE United States Patent and Trademark Office Address: COMMISSIONER FOR PATENTS P.O. Box 1450 Alexandria, Virginia 22313-1450 www.uspto.gov

NOTICE OF ALLOWANCE AND FEE(S) DUE

24498

7590

08/21/2008

Joseph J. Laks Thomson Licensing LLC 2 Independence Way, Patent Operations PO Box 5312 PRINCETON, NJ 08543

EXAMINER				
SPECTOR, DAVID N				
ART UNIT	PAPER NUMBER			

2873

DATE MAILED: 08/21/2008

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/589,117	08/11/2006	Estill Thone Hall JR.	PU040070	6053

TITLE OF INVENTION: APPARATUS FOR ADDING RED LIGHT TO A POLARIZED LIGHT SYSTEM

APPLN. TYPE	SMALL ENTITY	ISSUE FEE DUE	PUBLICATION FEE DUE	PREV. PAID ISSUE FEE	TOTAL FEE(S) DUE	DATE DUE
nonprovisional	NO	\$1440	\$300	\$0	\$1740	11/21/2008

THE APPLICATION IDENTIFIED ABOVE HAS BEEN EXAMINED AND IS ALLOWED FOR ISSUANCE AS A PATENT. PROSECUTION ON THE MERITS IS CLOSED. THIS NOTICE OF ALLOWANCE IS NOT A GRANT OF PATENT RIGHTS. THIS APPLICATION IS SUBJECT TO WITHDRAWAL FROM ISSUE AT THE INITIATIVE OF THE OFFICE OR UPON PETITION BY THE APPLICANT. SEE 37 CFR 1.313 AND MPEP 1308.

THE ISSUE FEE AND PUBLICATION FEE (IF REQUIRED) MUST BE PAID WITHIN THREE MONTHS FROM THE MAILING DATE OF THIS NOTICE OR THIS APPLICATION SHALL BE REGARDED AS ABANDONED. THIS STATUTORY PERIOD CANNOT BE EXTENDED. SEE 35 U.S.C. 151. THE ISSUE FEE DUE INDICATED ABOVE DOES NOT REFLECT A CREDIT FOR ANY PREVIOUSLY PAID ISSUE FEE IN THIS APPLICATION. IF AN ISSUE FEE HAS PREVIOUSLY BEEN PAID IN THIS APPLICATION (AS SHOWN ABOVE), THE RETURN OF PART B OF THIS FORM WILL BE CONSIDERED A REQUEST TO REAPPLY THE PREVIOUSLY PAID ISSUE FEE TOWARD THE ISSUE FEE NOW DUE.

HOW TO REPLY TO THIS NOTICE:

I. Review the SMALL ENTITY status shown above.

If the SMALL ENTITY is shown as YES, verify your current SMALL ENTITY status:

A. If the status is the same, pay the TOTAL FEE(S) DUE shown above

B. If the status above is to be removed, check box 5b on Part B - Fee(s) Transmittal and pay the PUBLICATION FEE (if required) and twice the amount of the ISSUE FEE shown above, or

If the SMALL ENTITY is shown as NO:

A. Pay TOTAL FEE(S) DUE shown above, or

B. If applicant claimed SMALL ENTITY status before, or is now claiming SMALL ENTITY status, check box 5a on Part B - Fee(s) Transmittal and pay the PUBLICATION FEE (if required) and 1/2 the ISSUE FEE shown above.

II. PART B - FEE(S) TRANSMITTAL, or its equivalent, must be completed and returned to the United States Patent and Trademark Office (USPTO) with your ISSUE FEE and PUBLICATION FEE (if required). If you are charging the fee(s) to your deposit account, section "4b" of Part B - Fee(s) Transmittal should be completed and an extra copy of the form should be submitted. If an equivalent of Part B is filed, a request to reapply a previously paid issue fee must be clearly made, and delays in processing may occur due to the difficulty in recognizing the paper as an equivalent of Part B.

III. All communications regarding this application must give the application number. Please direct all communications prior to issuance to Mail Stop ISSUE FEE unless advised to the contrary.

IMPORTANT REMINDER: Utility patents issuing on applications filed on or after Dec. 12, 1980 may require payment of maintenance fees. It is patentee's responsibility to ensure timely payment of maintenance fees when due.

PART B - FEE(S) TRANSMITTAL

Complete and send this form, together with applicable fee(s), to: Mail Mail Stop ISSUE FEE

Commissioner for Patents P.O. Box 1450 Alexandria, Virginia 22313-1450

or Fax (571)-273-2885

INSTRUCTIONS: This form should be used for transmitting the ISSUE FEE and PUBLICATION FEE (if required). Blocks 1 through 5 should be completed where ar in m

naintenance fee notifica	tions.	•	rders and notification of rank) specifying a new corres				
CURRENT CORRESPONDENCE ADDRESS (Note: Use Block 1 for any change of address)		Fee(Note: A certificate of mailing can only be used for domestic mailings of the Fee(s) Transmittal. This certificate cannot be used for any other accompanying papers. Each additional paper, such as an assignment or formal drawing, mus have its own certificate of mailing or transmission.				
24498	7590 08/21	/2008	*****		ificate of Mailing o		iccion
	sing LLC Way, Patent Operat	ions	I he Stat addr tran	reby certify that thi es Postal Service w essed to the Mail smitted to the USPI	s Fee(s) Transmitta ith sufficient postag Stop ISSUE FEE	il is being og ge for first address a	deposited with the United class mail in an envelope bove, or being facsimile
PO Box 5312 PRINCETON, N	JI 08543						(Depositor's name)
THI VELI OF U	10 000 10						(Signature)
							(Date)
APPLICATION NO.	FILING DATE		FIRST NAMED INVENTOR		ATTORNEY DOCK	ET NO.	CONFIRMATION NO.
10/589,117	08/11/2006		Estill Thone Hall JR.		PU040070		6053
ITLE OF INVENTION	: APPARATUS FOR AI	ODING RED LIGHT TO	A POLARIZED LIGHT S	YSTEM			
APPLN. TYPE	SMALL ENTITY	ISSUE FEE DUE	PUBLICATION FEE DUE	PREV. PAID ISSUE	FEE TOTAL FE	E(S) DUE	DATE DUE
nonprovisional	NO	\$1440	\$300	\$0	\$17	40	11/21/2008
EXAM	IINER	ART UNIT	CLASS-SUBCLASS]			
SPECTOR,	, DAVID N	2873	359-634000	J			
. Change of corresponde FR 1.363).	ence address or indication	n of "Fee Address" (37	2. For printing on the p	atent front page, lis	t .		
	ondence address (or Cha	nge of Correspondence	(1) the names of up to or agents OR, alternative		attorneys ¹ ——		
☐ Change of correspondence address (or Change of Correspondence Address form PTO/SB/122) attached. ☐ "Fee Address" indication (or "Fee Address" Indication form		(2) the name of a single firm (having as a member a registered attorney or agent) and the names of up to 2 registered patent attorneys or agents. If no name is listed, no name will be printed.					
PTO/SB/47; Rev 03-02 or more recent) attached. Use of a Customer 2							
			THE PATENT (print or type				
PLEASE NOTE: Unl recordation as set fort	less an assignee is identi h in 37 CFR 3.11. Comp	ified below, no assignee bletion of this form is NO	data will appear on the parts of the parts and substitute for filing an	atent. If an assigne assignment.	e is identified belo	ow, the doo	sument has been filed for
(A) NAME OF ASSIG	GNEE		(B) RESIDENCE: (CITY	and STATE OR C	OUNTRY)		
lease check the appropr	iate assignee category or	categories (will not be pr	inted on the patent): \Box	Individual 🖵 Co	rporation or other p	rivate grou	p entity 🔲 Government
a. The following fee(s)	are submitted:	46	o. Payment of Fee(s): (Plea	se first reapply an	y previously paid i	issue fee sl	own above)
Issue Fee	Jo small entity discount p	pormittad)	A check is enclosed.	d Form PTO 2028	is attached		
	# of Copies		☐ Payment by credit card. Form PTO-2038 is attached. ☐ The Director is hereby authorized to charge the required fee(s), any deficiency, or credit any				
Ch Fact Co.	- (C	1.1	overpayment, to Depo	sit Account Numbe	r ((enclose an	extra copy of this form).
_ ` .	tus (from status indicated is SMALL ENTITY state		☐ b. Applicant is no long	ger claiming SMAL	L ENTITY status. S	See 37 CFI	R 1.27(g)(2).
OTE: The Issue Fee and terest as shown by the	d Publication Fee (if requeecords of the United Sta	uired) will not be accepted tes Patent and Trademark	d from anyone other than to Office.	he applicant; a regis	stered attorney or ag	gent; or the	assignee or other party in
Authorized Signature				Date			
Typed or printed name				0			
his collection of inform n application. Confident abmitting the completed his form and/or suggesti	nation is required by 37 C tiality is governed by 35 d application form to the ions for reducing this but	FR 1.311. The informatic U.S.C. 122 and 37 CFR USPTO. Time will vary rden, should be sent to the	on is required to obtain or r 1.14. This collection is est depending upon the indiv e Chief Information Office	etain a benefit by the imated to take 12 n ridual case. Any corer, U.S. Patent and	ne public which is to ninutes to complete mments on the amo rademark Office, U	o file (and le, including bunt of time U.S. Depar	by the USPTO to process) gathering, preparing, and e you require to complete tment of Commerce, P.O.

Tl submitting the completed application form to the USPTO. Time will vary depending upon the individual case. Any commence of the completed application form to the USPTO. Time will vary depending upon the individual case. Any commence of the completed application form to the USPTO. Time will vary depending upon the individual case. Any commence of the commence of the



United States Patent and Trademark Office

UNITED STATES DEPARTMENT OF COMMERCE United States Patent and Trademark Office Address: COMMISSIONER FOR PATENTS P.O. Box 1450 Alexandria, Virginia 22313-1450 www.uspto.gov

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/589,117	08/11/2006	Estill Thone Hall JR.	PU040070	6053
24498 7:	590 08/21/2008		EXAM	INER
Joseph J. Laks		SPECTOR,	DAVID N	
Thomson Licensing LLC			ART UNIT	PAPER NUMBER
2 Independence Way, Patent Operations PO Box 5312 PRINCETON, NJ 08543		2873		
		DATE MAILED: 08/21/2008		
		DATE WHILED: 00/21/2000		

Determination of Patent Term Adjustment under 35 U.S.C. 154 (b)

(application filed on or after May 29, 2000)

The Patent Term Adjustment to date is 315 day(s). If the issue fee is paid on the date that is three months after the mailing date of this notice and the patent issues on the Tuesday before the date that is 28 weeks (six and a half months) after the mailing date of this notice, the Patent Term Adjustment will be 315 day(s).

If a Continued Prosecution Application (CPA) was filed in the above-identified application, the filing date that determines Patent Term Adjustment is the filing date of the most recent CPA.

Applicant will be able to obtain more detailed information by accessing the Patent Application Information Retrieval (PAIR) WEB site (http://pair.uspto.gov).

Any questions regarding the Patent Term Extension or Adjustment determination should be directed to the Office of Patent Legal Administration at (571)-272-7702. Questions relating to issue and publication fee payments should be directed to the Customer Service Center of the Office of Patent Publication at 1-(888)-786-0101 (571)-272-4200.

	Application No.	Applicant(s)			
	10/589,117	HALL, ESTILL THONE			
Notice of Allowability	Examiner	Art Unit			
	David N. Spector	2873			
	David N. Speciol	2073			
The MAILING DATE of this communication apperature All claims being allowable, PROSECUTION ON THE MERITS IS herewith (or previously mailed), a Notice of Allowance (PTOL-85) NOTICE OF ALLOWABILITY IS NOT A GRANT OF PATENT R of the Office or upon petition by the applicant. See 37 CFR 1.313	(OR REMAINS) CLOSED or other appropriate comm IGHTS . This application is	in this application. If not included nunication will be mailed in due course. THIS			
1. X This communication is responsive to Application filed 11 A	<u>ugust 2006</u> .				
2. The allowed claim(s) is/are <u>1-4</u> .					
 3. ☐ Acknowledgment is made of a claim for foreign priority unerstanding a) ☐ All b) ☐ Some* c) ☐ None of the: 1. ☐ Certified copies of the priority documents have 2. ☐ Certified copies of the priority documents have 	e been received. e been received in Applicat	on No			
Copies of the certified copies of the priority do	cuments have been receive	ed in this national stage application from the			
International Bureau (PCT Rule 17.2(a)).					
* Certified copies not received:					
Applicant has THREE MONTHS FROM THE "MAILING DATE" noted below. Failure to timely comply will result in ABANDONN THIS THREE-MONTH PERIOD IS NOT EXTENDABLE.		e a reply complying with the requirements			
4. A SUBSTITUTE OATH OR DECLARATION must be subminFORMAL PATENT APPLICATION (PTO-152) which give					
5. CORRECTED DRAWINGS (as "replacement sheets") must	st be submitted.				
(a) 🔲 including changes required by the Notice of Draftspers	son's Patent Drawing Revie	w (PTO-948) attached			
1) 🔲 hereto or 2) 🔲 to Paper No./Mail Date					
(b) ☐ including changes required by the attached Examiner' Paper No./Mail Date	s Amendment / Comment o	or in the Office action of			
Identifying indicia such as the application number (see 37 CFR 1 each sheet. Replacement sheet(s) should be labeled as such in t					
6. DEPOSIT OF and/or INFORMATION about the depo attached Examiner's comment regarding REQUIREMENT					
Attachment(s) 1. ☑ Notice of References Cited (PTO-892)	5. ☐ Notice of I	nformal Patent Application			
2. Notice of Draftperson's Patent Drawing Review (PTO-948)	6. Interview	Summary (PTO-413),			
3. ☑ Information Disclosure Statements (PTO/SB/08),	Paper No 7 ⊠ Evaminer'	./Mail Date s Amendment/Comment			
Paper No./Mail Date <u>0806/20060811</u>					
 Examiner's Comment Regarding Requirement for Deposit Examiner's Statement of Reasons for Allowance of Biological Material 					
9. ☐ Other					
/David N. Spector/					
Primary Examiner, Art Unit 2873					

Art Unit: 2873 Notice of Allowability

Page 2

An <u>EXAMINER'S AMENDMENT TO THE RECORD</u> follows below. Authorization for this examiner's amendment was given in a telephone interview with Patricia Verlangieri on August 15, 2008. Claims 1 and 2 are revised to replace the original recitation of "light" therein with the morespecific recitation of --white light-- under this amendment for clarity. Claim 2 is further revised to replace the word "cyan" with the word --blue-- for consistency with the instant specification, and a grammatical error is corrected in each of claims 3 and 4, under this examiners amendment. Should the changes and/or additions be unacceptable to applicant, an amendment may be filed as provided by 37 CFR 1.312. To ensure consideration of such an amendment, it MUST be submitted no later than the payment of the issue fee.

The list of claims below replaces all prior versions and listings of claims in the application:

- 1. (amended) An apparatus for adding red light to a polarized light system comprising: a first white light source and a second white light source; a polarizing beam splitter for combining S-polarized-light from said first white light source and P-polarized light from said second white light source; a first multi-layer filter means for rotating the polarization state of green light from said first white light source to the P-polarization state; a second multi-layer filter means for rotating said first white light source red light to the P-polarization state and said second white light source red light to the S-polarization state; and a reflective cleanup polarizer for reflecting P-polarized-light back to respective said first and second white light sources and passing S-polarized-light for further processing.
- 2. (amended) The apparatus as claimed in claim 1, wherein said reflective cleanup polarizer output light is red light from said second white light source and a blue light from said first white light source.
- 3. (amended) The apparatus as claimed in claim 1, wherein said first and second multilayer filter means is a plurality of plates that rotates the plane of polarization by 90-degrees to convert an S-polarized light component into a P-polarized component.

Art Unit: 2873 Notice of Allowability

4. (amended) The apparatus as claimed in claim 1, wherein said first and second multilayer filter means is a half wave retarder film that rotates the plane of polarization by 90 degrees to convert an S-polarized light component into a P-polarized component.

Claims 1-4 are allowed in view of the abovenoted examiner's amendment. All pending claims thus being allowable, prosecution on the merits is closed in this application.

The following is an <u>EXAMINER'S STATEMENT OF REASONS FOR ALLOWANCE</u> for the above-noted claims. The prior art taken either singly or in combination fails to anticipate or fairly suggest the features/limitations of applicant's sole independent claim, in such a manner that a rejection under 35 U.S.C. 102 or 103 would be proper. More specifically, in regard to claim 1 the prior art taken either singly or in combination fails to anticipate or fairly suggest apparatus for adding red light to a polarized light system including first and second white light sources and a polarizing beam splitter for combining S-polarized-light from the first white light source and P-polarized light from the second white light source; which further includes: "<u>a first multi-layer filter means for rotating the polarization state of green light from said first white light source to the P-polarization state"</u> (Claim 1, Line 5-6), and "<u>a second multi-layer filter means for rotating said first white light source red light to the P-polarization state and said second white light source red light to the S-polarization state" (Claim 1, Line 7-9), taken together in combination with the totality of particular features/limitations recited therein.</u>

Any comments considered necessary by applicant must be submitted no later than the payment of the issue fee and, to avoid processing delays, should preferably accompany the issue fee. Such submissions should be labeled "Comments on Statement of Reasons for Allowance."

The International Search Report (PCT/ISA/210) and the Written Opinion of the International Searching Authority (PCT/ISA/237) prepared by the European Patent Office for the parent (PCT/US2004/007104) for the instant National Stage application. All of the documents and other material cited in the PCT/ISA/210 and PCT/ISA/237 have been considered by the examiner in the prosecution of the instant application.

The prior art made of record and not relied upon is considered pertinent to applicant's disclosure. O'Conner (U.S. Patent No. 6,409,349 B1) was issued against a U.S. Patent Application

Application/Control Number: 10/589,117 Page 4

Art Unit: 2873 Notice of Allowability

cited in the above-noted international search report and written opinion\e. Sakata et al. (U.S. Patent No. 7,360,900 B2), Kato (U.S. Patent No. 7,070,281 B2) and Sato et al. (U.S. Patent No. 5,042,921 A) disclose other particular polarization splitting/combining apparatus.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

Any other inquiry concerning this communication or earlier communications from the examiner should be directed to David N. Spector whose telephone number is (571) 272-2338. The examiner can normally be reached at this number Monday through Friday between 6:00 AM and 2:30 PM. The Official FAX number for the United States Patent and Trademark Office is (571) 273-8300.

/David N. Spector/
Primary Examiner, Art Unit 2873